

Datalist - A Value Added Service to Enable Easy Data Selection



IN53C-1889

NASA/Goddard EARTH SCIENCES DATA and INFORMATION SERVICES CENTER (GES DISC)

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Abstract

Imagine a user wanting to study hurricane events. This could involve searching and downloading multiple data variables from multiple data sets. The currently available services from the Goddard Earth Sciences Data and Information Services Center (GES DISC) only allow the user to select one data set at a time. The GES DISC started a Datalist initiative, in order to enable users to easily select multiple data variables. A Datalist is a collection of predefined or user-defined data variables from one or more archived data sets. Target users of Datalists include science teams, individual science researchers, application users, and educational users. Datalists are more than just data. Datalists effectively provide users with a sophisticated integrated data and services package, including metadata, citation, documentation, visualization, and data-specific services, all available from one-stop shopping.

Datalists are created based on the software architecture of the GES DISC Unified User Interface (UI). The Datalist service is completely data-driven, and a Datalist is treated just as any other data set. The predefined Data Lists, created by the experienced GES DISC science support team, should save a significant amount of time that users would otherwise have to spend.

Problem

- Natural phenomenon study requires
 - Multiple dataset
 - Multiple variables
- New comers to earth science don't know where to start
- Current GES DIS available service
 - Only allow user to select variables from a single dataset at a time
 - Too many variables from a dataset are displayed, choice is hard

Solution

- GES DISC's new Datalist service
- A Data List is a collection of predefined or user-defined data variables from one or more archived datasets
- Value-add service
 - Subject Area Experts are the Curators of the datalist

Why the name?

It takes the name from music playlist.

GES DISC Datalist	Spotify/iTune/...
Dataset	Album
Variable	Song
Recommended playlist	Pre-defined Datalist
My favorite playlist	User defined Datalist

Search and Result

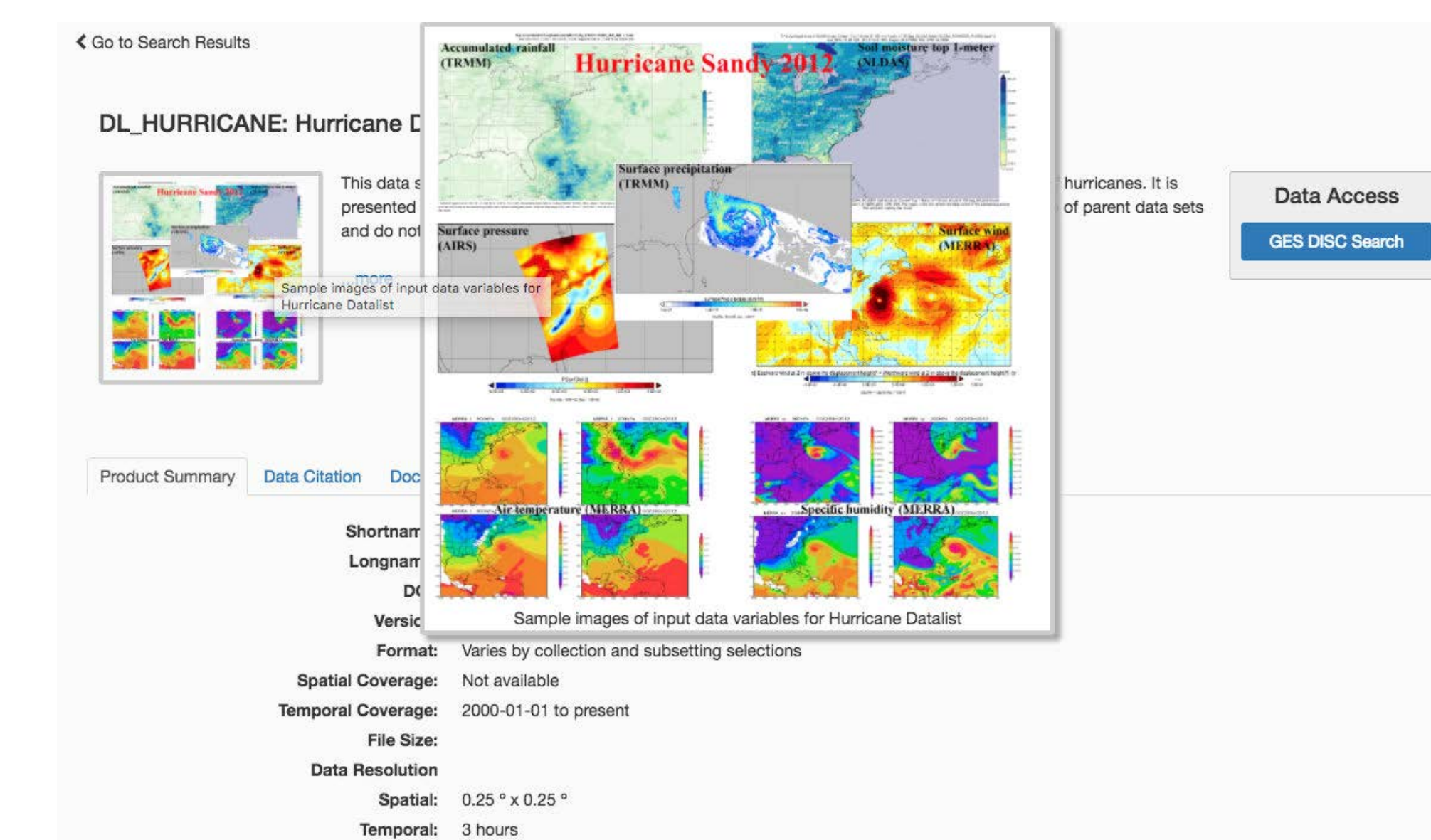
Explore GES DISC data

Search: hurricane

Showing 1 - 7 of 7 datasets associated with hurricane

Image	Dataset	Source	Temporal Resolution	Spatial Resolution	Process Level	Begin Date	End Date
	Hurricane Datalist (DL_HURRICANE-1)	NOAA/CI	3 hours, 1 day	0.25° x 0.25°, 0.1° x 0.1°	4	2000-01-01	present
	GPM (IMERG) Early Precipitation L3 1 day	GPM GMI, GPM	1 day	0.1° x 0.1°	3	2014-03-01	present

Landing Page



Subsetting

Variables: 3 variable(s) selected

- ☒ Aerosols
- ☒ Air Temperature
- ☒ Humidity
- ☒ Ozone and Trace Gases
- ☒ Precipitation
 - ☐ Bias corrected total surface precipitation
 - ☒ Total surface precipitation
 - ☒ precipitationCal
- ☒ Sea Level Pressure
- ☒ Sea Surface Temperature
- ☒ Soil Moisture and surface runoff
- ☒ Wind
 - ☒ Surface wind speed (hourly mean)
 - ☐ Surface wind maximum speed (hourly maximum)
 - ☐ 2 meter northward wind
 - ☐ 2 meter eastward wind
 - ☐ Eastward wind component
 - ☐ Northward wind component
 - ☐ Eastward wind component
 - ☐ Northward wind component

Downloading

GES DISC Downloads

Selected Options

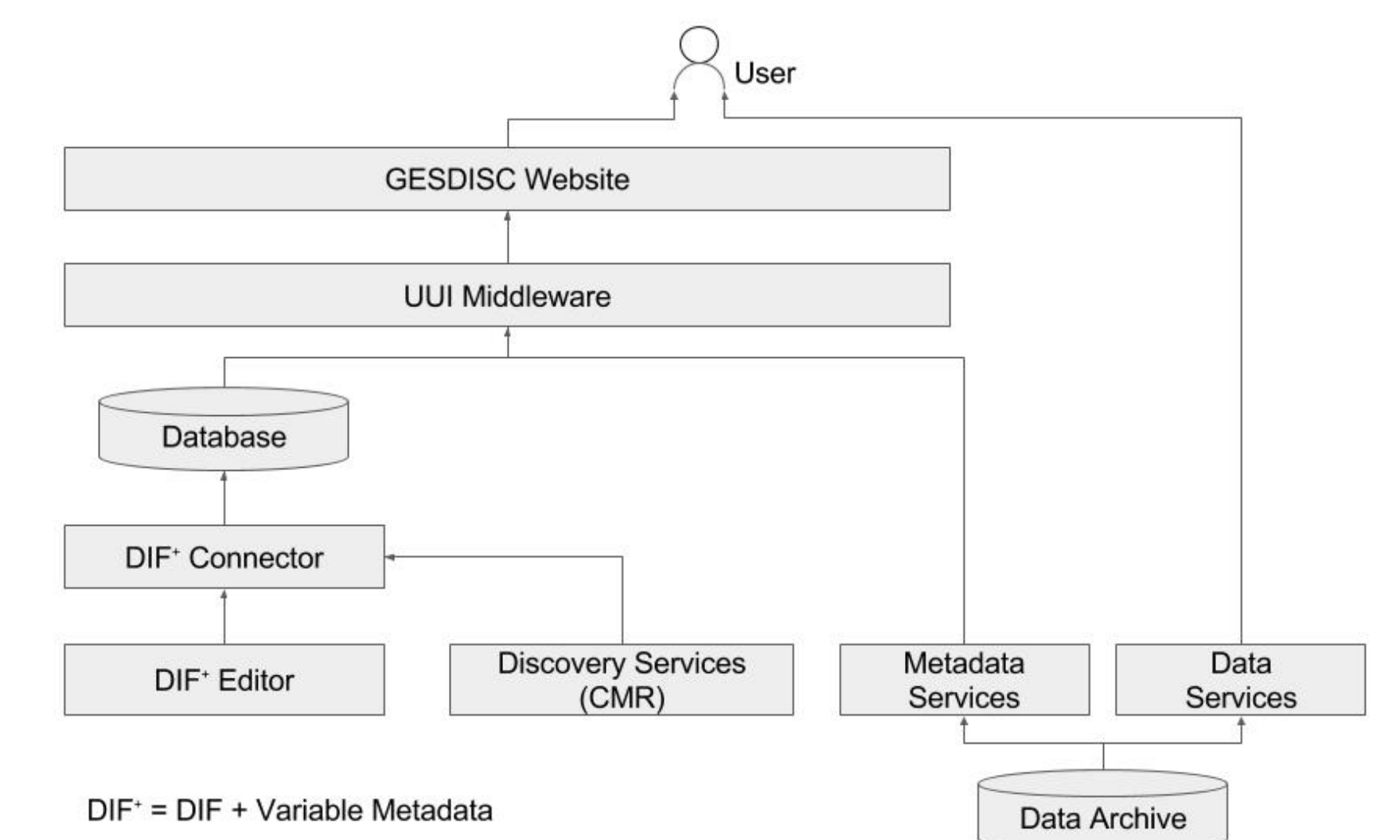
Results: Searching for data... (98%)
Complete (TRMM_3B42_Daily_V7)

Cancel request

Download link list

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Architecture



Future

- Datalist Curator's tool Spring 2017
- A-Train Datalist Early Spring 2017
- User-defined datalist Summer 2017
- Sharable datalist Summer 2017
- Datalist for event Fall 2017
- Smart datalist TBD

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Brother Poster

Shie et al.
NH53A-1985
Now
12/16/2016
13:40-18:00
Moscone South
Poster Hall

